

A005365

LIBRARY  
TECHNICAL REPORT SECTION  
NAVAL POSTGRADUATE SCHOOL  
MONTEREY, CALIFORNIA 93940



NAVY PERSONNEL RESEARCH AND DEVELOPMENT CENTER SAN DIEGO, CALIFORNIA 92152

NPRDC TR 75-18

JANUARY 1975

## AN EVALUATION OF INTERCULTURAL RELATIONS TRAINING FOR NAVY OVERSEAS PERSONNEL

Alan W. Lau  
Perry N. Blanchard

APPROVED FOR PUBLIC RELEASE  
DISTRIBUTION UNLIMITED

AN EVALUATION OF INTERCULTURAL RELATIONS  
TRAINING FOR NAVY OVERSEAS PERSONNEL

Alan W. Lau  
Perry N. Blanchard

Reviewed by  
Edward J. Pickering

Approved by  
James J. Regan  
Technical Director

Navy Personnel Research and Development Center  
San Diego, California 92152

UNCLASSIFIED

SECURITY CLASSIFICATION OF THIS PAGE (When Data Entered)

REPORT DOCUMENTATION PAGE		READ INSTRUCTIONS BEFORE COMPLETING FORM
1. REPORT NUMBER TR 75-18	2. GOVT ACCESSION NO.	3. RECIPIENT'S CATALOG NUMBER
4. TITLE (and Subtitle)  AN EVALUATION OF INTERCULTURAL RELATIONS TRAINING FOR NAVY OVERSEAS PERSONNEL		5. TYPE OF REPORT & PERIOD COVERED Final Report 1 Jul 1973 to 30 Jun 1974
		6. PERFORMING ORG. REPORT NUMBER
7. AUTHOR(s)  A. W. Lau P. N. Blanchard		8. CONTRACT OR GRANT NUMBER(s)
9. PERFORMING ORGANIZATION NAME AND ADDRESS Navy Personnel Research and Development Center San Diego, California 92152		10. PROGRAM ELEMENT, PROJECT, TASK AREA & WORK UNIT NUMBERS
11. CONTROLLING OFFICE NAME AND ADDRESS Project Manager Human Resource Development Project Office Bureau of Naval Personnel Washington, D. C. 20370		12. REPORT DATE January 1975
14. MONITORING AGENCY NAME & ADDRESS (if different from Controlling Office)		13. NUMBER OF PAGES 39
		15. SECURITY CLASS. (of this report)  UNCLASSIFIED
		15a. DECLASSIFICATION/DOWNGRADING SCHEDULE
16. DISTRIBUTION STATEMENT (of this Report)  Approved for public release; distribution unlimited.		
17. DISTRIBUTION STATEMENT (of the abstract entered in Block 20, if different from Report)		
18. SUPPLEMENTARY NOTES		
19. KEY WORDS (Continue on reverse side if necessary and identify by block number) Intercultural Relations Training Attitude Change Overseas Diplomacy Cross-cultural Interaction		
20. ABSTRACT (Continue on reverse side if necessary and identify by block number) Relatively little data exist concerning the effectiveness of Navy intercultural relations (ICR) training programs. In addition, much training research in this area is characterized by methodological and design inadequacies. The purposes of this study were to design and test a methodological model, and to provide an objective assessment of ICR training impact.  It was found that training had a modest but significant effect upon the attitudes of Overseas Duty Training (ODT)/Personnel Exchange Program (PEP) and Human		

Resource Development Center (HRDC) IDR Personnel. ODT/PEP personnel changed significantly on 13 of 24 scales and HRDC personnel on 9 of 24 scales ( $p < .05$ ). Scales measured self-actualization, flexibility, tolerance of ambiguity, acceptance of self and others, leadership styles, and basic motivational patterns. The failure to detect a greater degree of change may have been due to various test ceiling effects or to the nature of the change process itself.

Although the real test of program impact necessitates validation against external or in-country criteria, the results did indicate that the impact of ICR training, although modest, was consistent with the hypotheses generated for the evaluation of the training objectives of the program.

UNCLASSIFIED



## FOREWORD

This research was performed under Work Request PO 3-00081 (Feed-back in Human Response Training). The research was initiated in response to a request from the Human Resource Development Project Office (HRDPO) under Chief of Naval Personnel (Pers-P). An interim report has been published as Naval Personnel and Training Research Laboratory Research Report SRR 73-20, The Effectiveness of Intercultural Relations Training for Vietnam Advisors, June 1973. The purpose of the present research was to determine if intercultural Relations (ICR) training programs were having desired effects in terms of attitudinal and long-range behavioral changes. The training programs evaluated were Overseas Duty Training (ODT)/ Personnel Exchange Program (PEP) and Human Resource Development Center (HRDC) ICR Specialists training.

The assistance of the ICR training staff of the Naval Amphibious School, Coronado, California, is gratefully acknowledged.

J. J. CLARKIN  
Commanding Officer



## SUMMARY

### Purpose

Intercultural relations (ICR) training programs are designed to meet the following objectives: to extend United States diplomacy overseas, to increase job effectiveness, and to increase tour satisfaction. The primary purpose of the research described in this report was to examine the degree to which such training programs (Overseas Duty Training (ODT), Personnel Exchange Program (PEP) training, and Human Resource Development Center (HRDC) ICR Specialist Training) were having desired effects in terms of attitudinal and long-range behavioral change. Since much training research is characterized by methodological and design inadequacies, an additional purpose was to develop and utilize a methodological approach which employed scientific standards of experimental design. This approach was designed to provide information which could be used to improve and strengthen ICR training and to provide an objective assessment of training effectiveness and impact.

### Approach

Following the specification of program objectives, a series of standardized measures was selected for assessing relevant attitudinal change. Baseline data were collected from ODT/PEP and HRDC experimental group trainees on scales of flexibility, self-acceptance, acceptance of others, leadership style, level of self-actualization, tolerance of ambiguity, and basic motivational patterns. Pretest and posttest information was used as a reference in assessing skills following 3 weeks of training for ODT/PEP personnel and 6 weeks of training for HRDC personnel. Tests were also administered to a control group and, to measure test reactivity, to other groups of personnel tested only after training. Pretest and posttest difference scores were tested for statistical significance. It was hypothesized that ICR training would have a greater impact upon attitude change than that obtained in a comparable control group. Unfortunately, long-term effects were not examined since follow-up research procedures were not carried out.

### Results

Minimal support was found for the hypothesis that the experimental groups changed significantly more than the control group. It was found that test ceiling effects, due to the initial level of scores, limited the amount of change. The nature of the change process itself may account for the modest changes found. The information which is provided, however, does indicate that the impact of ICR training is consistent with specified short-range training objectives and goals.



## Recommendations

Follow-up procedures are recommended to validate change measures against external criteria such as career and job satisfaction, objective measures of on-the-job performance, and attitudes toward host nationals. The data bank developed for this evaluation is available for these follow-up purposes.

Due to the considerable item content overlap between the various attitude scales, it is recommended that empirically constructed keys be developed to provide a homogeneous measure of cultural awareness. This would reduce considerably the time required for attitude measurement without reducing predictive efficiency.

# TABLE OF CONTENTS

	Page
A. Introduction . . . . .	1
1. Program Description . . . . .	1
2. Review of the Literature . . . . .	2
3. The Present Effort . . . . .	3
a. Course Critique . . . . .	4
b. Readministration of Change Scales . . . . .	4
c. In-Country Attitude Survey . . . . .	4
B. Procedures . . . . .	5
1. Specification of Attitudinal Goals . . . . .	5
2. Selection and Development of Relevant Tests . . . . .	5
a. Leadership Opinion Questionnaire (LOQ) . . . . .	6
b. Flexibility Scale (F) . . . . .	6
c. Survey of Interpersonal Values (SIV) . . . . .	6
d. Self-acceptance (SA)/Acceptance of Others (AO) . . . . .	6
e. Tolerance of Ambiguity (TA) . . . . .	6
f. Personal Orientation Inventory (POI) . . . . .	6
g. Change Questionnaire (CQ) . . . . .	6
h. Biographical Questionnaire (BQ) . . . . .	7
3. Collection of Data from Experimental and Control Groups . . . . .	7
4. Assessment of Training Effectiveness . . . . .	7
C. Subjects . . . . .	8
D. Results and Discussion . . . . .	11
1. Test-measured Attitude Change . . . . .	11
2. Self-reported Change . . . . .	16
3. Factor Analysis of ODT/PEP Test Scores . . . . .	16
4. Comparison of ODT/PEP and HRDC Personnel . . . . .	19
E. Summary and Conclusions . . . . .	21
References . . . . .	23
Appendix A: Survey of In-Country Attitudes and Experiences . . . . .	25
Distribution List . . . . .	33

## LIST OF TABLES

	Page
1. Characteristics of Trainees in the Experimental and Control Groups . . . . .	9
2. Means, Standard Deviations, and Change for Experimental and Control Groups . . . . .	13
3. Self-reported Positive Change for Experimental and Control Groups . . . . .	17
4. Intercorrelations Among ODT/PEP Pretests and Correlations with Self-reported Change . . . . .	18
5. Pre - Post Factor Structures for ODT/PEP Personnel . . . . .	20

# An Evaluation of Intercultural Relations Training for Navy Overseas Personnel

## A. Introduction

### 1. Program Description

In July 1972, the Chief of Naval Operations ordered all commanding officers of overseas shore activities, afloat units, and those CONUS units whose operations affect the activities of overseas-based personnel to:

"...initiate and continue action program which affect positive relations between commands and foreign nationals and which assist individual Naval personnel and their families to work effectively, live with dignity and satisfaction, and function as positive representatives of the Navy and the United States while overseas."

The Intercultural Relations (ICR) programs conducted by the Naval Amphibious Base at Coronado, California, and at Little Creek, Virginia were designed to meet this objective.

These ICR programs utilize various innovative materials and methods. Training includes the use of classroom exercises such as group discussions, role-playing, case studies, and films. The programs are developed around experiential and cognitive learning in small groups, with active trainee participation and two-way communication. This approach is designed to create both student involvement and opportunities to practice interpersonal skills. Implicit in this approach is an appreciation that technical expertise and language training are necessary, but not sufficient, conditions for effective in-country behavior and cross-cultural adjustment. Specifically, training deals with perceptions of host nationals, concerns about interaction with host nationals, and preparation for cross-cultural interactions. Major training modules include awareness, cultural systems, culture shock, change concepts, problem-solving skills, verbal as well as nonverbal communication, and comparative linguistics. The rationale behind training is that differences in values and assumptions are typically the basis of conflicts and misunderstanding in dealing with host nationals. Therefore, training concerns the reduction of unrealistic expectations through greater knowledge about the new culture, such as information about customs, geography, language, and history.

In order to provide predeployment training to personnel going overseas, several ICR programs were developed. The Personnel Exchange Program (PEP) was designed to prepare personnel for assignment to a foreign Navy (shore-based or on-board ship), and the Overseas Duty Training (ODT) program was designed for personnel assigned to an overseas U. S. Navy facility. The content of both 3-week training programs

was identical, and results in this report combine both programs. Another training program, the Human Resource Development Center (HRDC) ICR Specialist training program, was designed to prepare personnel to become ICR instructors.<sup>1</sup> This program contained modules in teaching techniques, group processes, course preparation, and testing and evaluation procedures.

## 2. Review of the Literature

The major emphasis of ICR training programs has been either on the selection of personnel to be trained or on the development and institutionalization of programs (Lau, 1974). Relatively little data exist concerning program evaluation and measurement of effectiveness (Brislin, 1970; Hoehn, 1966; Foster and Danielson, 1966; Haines, 1964; and Wight, 1970). The same general picture characterizes other group-centered training, such as management and organizational development training (Hand and Slocum, 1972; Lieberman, Yalom, and Miles, 1972; Campbell and Dunnette, 1968; and Miles, 1964). In addition to a dearth of evaluative data, major methodological and design inadequacies have not been overcome (Campbell and Dunnette, 1968). The vast majority of training evaluations have depended upon self-report techniques. Objective measures of behavioral and attitudinal change have rarely been developed or utilized as criteria of program effectiveness. Specifically, the major methodological flaws in the evaluation of group-centered training programs include: (a) a lack of adequate base-rate or pretraining measures, (b) a failure to include matched control groups, (c) a lack of independent observers to rate attitudinal or behavioral change, (d) a failure to control for the effect of pretest measures on posttest measures, i.e., test reactivity, (e) a failure to employ dependent measures consistent with group goals, and (f) with few exceptions, failure to include longitudinal follow-up as well as transfer of training measurement. In addition, the great majority of training research has been concerned with internal change criteria such as attitude and opinion shifts related to what trainees thought they had learned. In order to effectively evaluate training, Andrews (1966), Campbell et al (1970), and MacKinney (1957) have indicated a need for the utilization of control groups and relevant pre and post measures. Regarding test reactivity, Fishbein and Ajzen (1962) make the point that change or difference scores tend to lead to invalid conclusions unless post-only designs are utilized. The few studies that have used a scientific design tend to show that group-centered training has a positive effect on attitudes and performance. However, only

---

<sup>1</sup>While the effectiveness of the 6-week HRDC program is evaluated in this study, the program was revised in February 1974 and conclusions reached may not generalize to the revised program.

five group-centered training programs, utilizing before and after measures with experimental and control groups, were found in the literature by Hand and Slocum (1972).

Despite the lack of evidence concerning the effect of ICR training and the often technically inadequate nature of the research reviewed, an overall impression emerges that it is possible for training to have a positive impact on attitudes and effectiveness in the foreign setting. It is clear that personnel who are sent overseas with no preparation for the culture-related aspects of their jobs, except the reading of some handbooks or discussions with people who have served in similar assignments, often have been found to perform in an unsatisfactory manner (Fiedler, Mitchell, and Triandis, 1971).

The immediate objective of the Navy's ICR training programs is to change the attitudes and beliefs of trainees in a positive direction. However, it is necessary to show that a relationship exists between such attitudes and beliefs, and actual behavior. Ajzen and Fishbein (1973) have shown that there is a consistent relationship between attitudes, beliefs, and behavior. It should be noted, however, that this relationship has been shown to be unstable over time. The longer the interval between measurement of attitudes and beliefs and the measurement of the behavioral criteria, the less stable the relationship.

In an earlier study on the effectiveness of predeployment ICR training for Vietnam advisors (Lau and Curtis, 1973), the conclusion was reached that the program was partially effective in terms of the attitudinal changes of trainees as compared to changes in a comparable control group. Due to curtailment of the program, however, the study utilized a relatively small number of subjects and, for the same reason, no posttraining measures were obtained.

Intercultural relations training often includes role-playing exercises, case studies, group discussions, and the written and oral presentation of cognitive information. Although Wight (1970) considers experiential learning to be the cornerstone of ICR training, conclusions reached by an evaluation of the total program cannot be attributed solely to experiential learning. There have been no conclusive studies that have compared the relative effectiveness of training without experiential learning to training with experiential learning. With reference to the ICR evaluation described in this report, it is difficult to isolate the module or modules that contributed most to changes. The total programs are evaluated, but the contribution of each module is not.

An area that needs considerable attention is the identification of critical behaviors which constitute effective overseas performance. Without this information, it is difficult to assess the success of training. Research on the effectiveness of ICR training has been highly dependent on usage of verbal, self-report measures, and, with the exception of a report by Yellen and Hoover (1973), little data have been generated on actual behaviors toward host nationals.

### 3. The Present Effort

The purpose of this research was to determine whether or not ODT/PEP and HRDC training was having the desired effects in terms of attitudinal and long-range behavioral change. The research design was originally organized according to two types of evaluative criteria--internal (or process) such as attitudes and external (or product) criteria, including longitudinal, in-country performance measures. Since it is conceivable that internal criteria were achieved and external criteria were not, measurement of the latter would indicate whether skills learned in ICR training are transferred and practiced when graduates are stationed in the foreign setting. Several research procedures and instruments were proposed for the follow-up phase (Lau and Blanchard, 1973). These were as follows:

a. Course Critique. This measure is similar to the current in-house course critique administered at the conclusion of ICR training. It was designed to obtain information regarding how personnel perceived the impact of training 6 months after graduation. Relevant considerations concerned such elements as reactions toward training, how training could be improved, how training had helped the graduates, and what effects training had upon self-reports of job performance and job satisfaction.

b. Readministration of Change Scales. It is not known whether significant attitudinal change persists over time, or becomes modified by in-country experiences. The initial design of the evaluation included readministration of several of the change scales.

c. In-country Attitude Survey. A critical criterion of program effectiveness is the actual behaviors and attitudes of graduates now in-country. One relevant question concerns whether graduates have more favorable attitudes toward host nationals than personnel who have not been exposed to ICR training. A survey for ODT/PEP graduates dealing with these attitudes was developed and is included in this report as Appendix A.

Largely due to inadequate project funding, these follow-up procedures were not utilized in this evaluation. As a result, in-country performance and the stability of change were not measured. It should be emphasized, however, that pretest and posttest attitude test scores are available for follow-up purposes. The authors encourage Navy program managers to consider making an attempt to measure the long-term effectiveness of ICR training in terms of external criteria.

Although proposed follow-up procedures did not materialize, this report presents useful feedback information regarding the attitudinal changes that occurred during the 3-week ODT/PEP and the 6-week HRDC ICR specialist training programs.

## B. Procedures

### 1. Specification of Attitudinal Goals

The initial step involved a description of program background and an examination of training goals. Discussion with trainers and program managers, results reported in the psychological literature for similar training programs, and an earlier study on the effectiveness of ICR training for Vietnam advisors (Lau and Curtis, 1973) indicated that the following were major adjustment or attitudinal training goals:

- a. Increased ability to tolerate ambiguity
- b. Increased adaptability
- c. Increased self-awareness and self-insight concerning one's behavior and its effect upon others
- d. Increased interpersonal sensitivity (empathy)
- e. Increased self-acceptance and acceptance of others
- f. Increased consideration shown to co-workers and subordinates and maintenance of a high task orientation
- g. The development of an attitude of openness to new experiences
- h. Reduced dogmatism and ethnocentrism.

### 2. Selection and Development of Relevant Tests

This step involved the selection and/or construction of objective evaluative instruments that measured attitudes specified as being training goals. The research literature indicated that a number of published tests showed promise for measuring these changes. The instruments chosen have been found by other researchers to measure the effects of human relations and management training in the industrial setting with acceptable levels of reliability and validity.

The following instruments were utilized to assess changes resulting from PEP/ODT and HRDC training:<sup>2</sup>

---

<sup>2</sup>The Peer-Nomination Form used in the Vietnam ICR evaluation was not used in the present study. This was because class size rarely was large enough for this form to be useful.



a. Leadership Opinion Questionnaire (LOQ). This questionnaire measures two independent dimensions of leadership style--structure and consideration. The LOQ has been used in evaluating a variety of management development programs (Fleishman and Harris, 1962; Fleishman, 1969).

High scores on consideration characterize leaders who allow subordinates more participation in decision-making and two-way communications. High scores on structure characterize leaders who organize and define group activities toward goal attainment and define roles that the leader expects each subordinate to assume.

b. Flexibility Scale (F). This instrument measures a variable hypothesized to be associated with resistance to attitude change. It represents an experimental instrument designed to identify individuals likely to have problems in accepting criticism, adapting to new situations, and/or in accepting the values of other individuals.

c. Survey of Interpersonal Values (SIV). This is a measure of basic motivational patterns (Gordon, 1960). Scores are provided on need for recognition, independence, leadership, benevolence, conformity, and support.

d. Self-acceptance (SA)/Acceptance of Others (AO). This instrument was adapted from two scales originally developed by Berger (1952). Self-acceptance is defined as the extent to which an individual is guided by internalized values (rather than external pressure), a sense of self-worth, and an absence of self-consciousness. The acceptance of others scale measures the degree to which an individual perceives others without preconceptions and refrains from placing his values on others.

e. Tolerance of Ambiguity (TA). This instrument is designed to measure the position of an individual on a continuum from a strong tendency to perceive ambiguous situations as threatening to a strong tendency to view ambiguous situations as desirable (Budner, 1962).

f. Personal Orientation Inventory (POI). This inventory provides a measure of Maslow's concept of self-actualization as it relates to personal development and the ability to develop interpersonal relationships (Shostrom, 1966). Scores are provided on time competence, inner directed, self-actualization value, existentiality, feeling reactivity, spontaneity, self-regard, self-acceptance, nature of man, synergy, acceptance of aggression, capacity for intimate contact.

g. Change Questionnaire (CQ). This questionnaire was used to measure self-reported change resulting from participation in training. It was administered only at the conclusion of training, at which time trainees were asked to indicate the direction of change (if any) by checking a series of 25 bipolar adjectives (e.g., tense--relaxed, rigid in thinking--flexible in thinking, etc.). If the trainee had not changed, he was instructed to leave the item blank.

h. Biographical Questionnaire (BQ). This instrument asked questions of trainees such as age, educational background, pay grade, and number of enlistments. This information was gathered in order to assess the influence of biographical characteristics upon the change measures.

### 3. Collection of Data from Experimental and Control Groups

With the exception of the Change Questionnaire, baseline data were collected from trainees on all of the above measures. This information was used to assess change following training.

In order to insure that changes in the experimental group were not due to mere passage of time or low test reliability, tests were also administered to a control group. The control group in this study was tested during language training at the Defense Language Institute, Monterey. Language training precedes PEP training. The pretest to posttest interval in the control group was 4 weeks, which was reasonably equivalent to the ICR training intervals of 3 or 6 weeks.

To measure the effect of pretesting on final testing, a sample of trainees in both ICR programs was tested only after training (post-only). This was done to determine the degree to which trainees might have been sensitized by taking the pretests.

### 4. Assessment of Training Effectiveness

This step involved an examination of attitudinal change experienced by trainees. Pretest and posttest scores on the various scales were compared and tested for statistical significance, using "t" tests (McNemar, 1960). This procedure was followed for both the control and experimental groups. It was hypothesized that ICR training would have a significant impact upon attitude change, whereas no significant attitude change would be found in the control group. To measure test reactivity, scores for trainees in the post-only groups were compared to posttest scores of trainees in the experimental groups. In order to get a clearer picture of the nature of the attitude changes that occurred over training, a factor analysis of the intercorrelations among the various tests was conducted.

### C. Subjects

There were 116 trainees in the 12 ODT and four PEP classes tested from December 1972 through April 1974. Of this number, 16 were dependents. In the six HRDC classes tested from November 1972 through February 1974, there were 46 trainees, of whom two were dependents. In the post-only groups, 19 ODT/PEP and 13 HRDC graduates were tested.

Pretests and posttests were also administered to 20 trainees enrolled in language training at the Defense Language Institute. As noted earlier, these trainees were scheduled to begin PEP training after completion of language preparation.

Table 1 shows the pay grade, educational level, age distribution, number of overseas deployments, and other selected biographical characteristics for the experimental and control groups. Responses for the two post-only groups are not presented. There were no substantial differences on biographical data characteristics between experimental and the respective ODT/PEP or HRDC post-only groups, or between the control group and the ODT/PEP group. HRDC trainees differed from ODT/PEP trainees and the control group in that the former consisted of more officers with a consequent lower age and higher level of education. To some degree, ODT/PEP trainees reported a more favorable attitude toward Navy life, and a higher percentage planned to reenlist or extend on active duty.

TABLE 1

Characteristics of Trainees in the  
Experimental and Control Groups

Item	<u>ODT/PEP</u> <u>Experimental Group</u> (N=116)		<u>HRDC</u> <u>Experimental Group</u> (N=46)		<u>Control Group</u> (N=20)	
	N	%	N	%	N	%
<u>1. Present Pay Grade</u>						
a. E-5 or below	17	15	8	17	0	0
b. E-6	14	12	6	13	5	25
c. E-7 to E-9	38	32	8	17	7	35
d. Officer	31	27	22	49	5	25
e. Dependent	16	14	2	4	3	15
<u>2. Educational Level</u>						
a. Not High School Graduate	2	2	1	2	1	5
b. High School Graduate (or GED)	50	42	4	9	12	60
c. Some College	23	20	15	33	2	10
d. College Graduate	18	16	19	41	2	10
e. Post-Graduate Work	23	20	7	15	3	15
<u>3. Age</u>						
a. Under 25 Years	11	9	26	56	1	5
b. 25-29	29	25	11	24	2	10
c. 30-34	43	37	3	7	8	40
d. 35-39	23	20	5	11	6	30
e. 40-49	10	9	1	2	3	15
<u>4. First Enlistment<sup>1</sup></u>						
a. Yes	12	12	12	27	1	6
b. No	88	88	32	73	16	94
<u>5. Plan to Reenlist or Extend on Active Duty<sup>1</sup></u>						
a. Yes	71	71	20	45	14	82
b. No	20	20	11	25	2	12
c. Undecided	9	9	13	30	1	6
						(Continued)

NOTE: <sup>1</sup>For these items dependents are not included.

TABLE 1 (Continued)

Item	<u>ODT/PEP</u> Experimental Group (N=116)		<u>HRDC</u> Experimental Group (N=46)		Control Group (N=20)	
	N	%	N	%	N	%
6. <u>Attitude toward the Navy</u> <sup>1</sup>						
a. Very satisfied	57	57	11	25	10	59
b. Satisfied	38	38	25	56	7	41
c. Neither satisfied nor dissatisfied	5	5	4	9	0	0
d. Dissatisfied	0	0	2	5	0	0
e. Very dissatisfied	0	0	2	5	0	0
7. <u>Number of Overseas Deployments (4 months or more)</u> <sup>1</sup>						
a. None	11	11	7	16	4	24
b. One	11	11	7	16	4	24
c. Two	13	13	10	23	2	11
d. Three	8	8	5	11	3	17
e. Four or more	57	57	15	34	4	24

NOTE: <sup>1</sup>For these items dependents are not included.

## D. Results and Discussion

This section is organized around several research questions. First, significant changes on the various attitude scales from the pretest to the posttest are assessed in relation to whether or not changes are significantly larger for trainees in the ODT/PEP and HRDC experimental groups than the control group. Secondly, the information on self-reported change is examined. The next question investigated concerns the consistency and nature of what is measured by the various tests. A final question examines the pretest differences between ODT/PEP and HRDC trainees. This analysis sheds some light on the selection process for ICR-trained personnel.

### 1. Test-measured Attitude Change

Various hypotheses were generated regarding change as a result of ICR training. These were based upon results reported in the literature for selected scales and upon previous research on the ICR Vietnam program. Hypotheses were also based upon specified course goals. Specifically, it was hypothesized that significant positive change would be found on the following: consideration, structure, independence, self-acceptance, acceptance of others, tolerance of ambiguity, flexibility, and six of 12 POI scales (extentuality, feeling reactivity, spontaneity, self-regard, self-acceptance, and capacity for intimate contact).

The first analysis centered around the question of pretest differences between the ODT/PEP experimental group and the control group<sup>3</sup>. It was found that there was significant difference on three of 24 scales ( $P < .05$ ). The control group scored lower than the experimental group on tolerance of ambiguity and support, and significantly higher on conformity. Despite these differences, it was concluded that the two groups were essentially the same before training.

The second analysis concerned the effect of pretesting on final testing. In this analysis, the differences between post-only groups and posttest scores for trainees in the two experimental groups were compared. It was found that ODT/PEP trainees in the post-only groups scored significantly lower on two POI scales--inner-directed and feelings reactivity ( $p < .05$ ). The HRDC post-only sample scored significantly lower on flexibility, independence, and three POI scales (inner directed, feeling reactivity, and capacity for intimate contact). With respect to the POI, there is some evidence for test reactivity.

---

<sup>3</sup>On the pretest, it was not anticipated that HRDC trainees would be comparable to either ODT/PEP trainees or the control group which consisted of prospective PEP trainees. Thus, these differences were not tested.

Although test reactivity was not found in the ICR Vietnam evaluation and sample sizes in the present study were small, exposure to the pretest appears to lead to higher scores on several POI scales following training.

Table 2 presents the means, standard deviations, and critical ratios between pretest and posttest scores for the two experimental groups (ODT/PEP and HRDC) and the control group. Trainees in ODT/PEP earned significantly different scores on 13 of 24 change scales ( $p < .05$ ), HRDC trainees changed significantly on nine of 24 scales, and the control group changed significantly on only two--independence and capacity for intimate contact. Reasonably parallel attitude changes were found in the two experimental groups. Both groups changed significantly on structure, independence, inner directed, feeling reactivity, and the POI self-acceptance scale.

When the absolute number of experimental group changes is compared to control group changes, results indicate that training had a modest but significant impact upon attitudes. The direction of these changes largely supported the hypotheses generated for this evaluation.

It should be noted that the initial level of scores is an important consideration in studies resulting from training. If pretest scores are already exceptionally high, it is unreasonable, due to a ceiling effect, to anticipate marked change over training. For ODT/PEP trainees, scores on consideration were considerably higher (approximately one standard deviation) than those reported in the LOQ Manual (1969) for Navy Officer candidates. HRDC pretest scores on consideration were even higher. Norms reported by Berger (1952) for the self-acceptance scale show that pretest scores for both experimental groups were also approximately one standard deviation higher than scores of a sample of college students. Norms for acceptance of others are not reported. Pretest scores on independence for ODT/PEP reached the 59th percentile and the 71st percentile for HRDC trainees. Finally, college student norms in the POI Manual (1966) indicate that ODT/PEP pretest scores on POI scales ranged from the 74th percentile for feeling reactivity to the 88th percentile for inner-directed. These findings indicate that ODT/PEP trainees represent a highly select group before training. For this reason, substantial pretest-posttest change should not be expected on many of these scales.<sup>4</sup>

Despite these ceiling effects, trainees in the ODT/PEP group earned significantly higher posttest scores on flexibility, independence, and self-acceptance, and significantly lower posttest scores on structure and needs for recognition. Increases in POI scores, although

---

<sup>4</sup> It should also be noted that the maximum score on the experimental flexibility scale is 48. Since HRDC pretest scores were 42.5, significant change on this scale should also not be expected.

TABLE 2

Means, Standard Deviations, and Change for Experimental and Control Groups

	ODI/PEP EXPERIMENTAL GROUP					HRDC EXPERIMENTAL GROUP					CONTROL GROUP							
	N	$\bar{X}$	S.O.	PRETEST	POSTTEST	CHANGE	N	$\bar{X}$	S.O.	PRETEST	POSTTEST	CHANGE	N	$\bar{X}$	S.O.	PRETEST	POSTTEST	CHANGE
Flexibility	109	34.9	5.3	36.0	5.4	1.1***	31	42.5	3.2	41.7	3.8	-0.8	18	34.1	5.1	34.3	5.8	0.2
Tolerance of Ambiguity	77	50.8	10.4	49.7	10.8	-1.1	21	49.1	9.5	48.1	8.9	-1.0	19	56.6	9.0	54.5	9.2	-2.1
Leadership Opinion Questionnaire																		
Consideration	100	52.8	6.4	52.5	6.7	-0.3	43	57.9	6.6	56.5	6.9	-1.4	19	50.5	7.6	47.3	7.4	-3.2
Structure	100	50.9	5.8	49.3	6.9	-1.6**	43	46.9	6.4	45.2	6.8	-1.7*	19	51.7	7.3	52.5	7.9	0.8
Survey of Interpersonal Values																		
Support	80	15.0	5.7	14.6	6.0	-0.4	43	15.1	5.2	17.1	4.7	2.0**	16	12.2	4.8	12.6	5.8	0.4
Conformity	80	15.9	6.5	15.2	6.9	-0.7	43	11.2	6.3	9.2	5.8	-2.0**	16	19.6	4.1	17.8	7.4	-1.8
Recognition	80	10.8	4.7	9.7	4.1	-1.1**	43	10.5	4.9	10.1	3.7	-0.4	16	8.9	4.1	8.6	3.5	-0.3
Independence	80	15.2	6.0	17.9	6.1	2.7***	43	19.2	6.3	21.3	6.9	2.1**	16	14.3	4.9	17.1	8.2	2.8*
Benevolence	80	16.9	6.4	16.2	6.8	-0.7	43	17.5	6.1	16.1	6.6	-1.4*	16	17.4	5.9	15.7	7.9	-1.7
Leadership	80	15.8	7.5	16.2	9.1	0.4	43	16.4	6.2	16.0	6.4	-0.4	16	17.3	7.5	18.3	8.9	1.0
Self-Acceptance	76	151.2	17.5	154.6	15.6	3.4**	21	147.1	20.5	151.0	15.6	3.9	18	155.3	15.4	156.9	14.1	1.6
Acceptance of Others	76	108.8	13.2	110.6	11.3	1.8	21	107.2	11.9	113.1	9.7	5.9*	18	110.8	12.8	107.8	12.6	-3.0
Personal Orientation Inventory																		
Time Competence	91	17.5	3.2	17.7	3.0	0.2	44	17.9	2.5	18.5	2.4	0.6	19	17.8	2.0	18.4	1.5	0.6
Inner Directed	91	84.3	9.1	87.3	10.6	3.0***	44	88.2	10.0	92.3	10.6	4.1**	19	86.6	8.0	89.6	8.3	3.0
Self-Actualization Value	91	21.1	2.4	21.3	2.6	0.2	44	21.3	2.3	21.3	2.3	0.0	19	21.8	2.7	21.9	2.1	0.1
Existentiality	91	19.8	4.3	20.7	4.6	0.9**	44	21.5	4.1	22.1	4.2	0.6	19	19.6	4.2	20.5	4.9	0.9
Feeling Reactivity	91	15.4	2.6	16.3	2.3	0.9***	44	16.3	2.9	17.5	2.8	1.2*	19	16.1	2.6	16.7	2.7	0.6
Spontaneity	91	12.5	2.0	13.0	2.1	0.5**	44	13.3	2.2	13.7	2.4	0.4	19	13.1	2.1	13.7	2.1	0.6
Self-Regard	91	13.2	1.5	13.4	2.1	0.2	44	13.1	2.0	13.4	1.9	0.3	19	13.7	1.4	13.9	1.3	0.2
Self-Acceptance	91	15.8	3.3	16.8	3.9	1.0***	44	16.9	3.4	17.9	3.0	1.0*	19	15.9	2.7	16.8	3.0	0.9
Nature of Man	91	11.8	2.1	12.2	1.7	0.4*	44	11.5	1.8	12.2	1.9	0.7	19	12.3	1.5	12.7	1.3	0.4
Synergy	91	7.3	1.3	7.2	1.4	-0.1	44	7.7	1.0	7.5	1.0	-0.2	19	7.4	1.1	7.4	1.0	0.0
Acceptance of Aggression	91	16.4	3.1	17.2	2.9	0.8***	44	16.8	3.3	17.2	3.0	0.4	19	17.2	2.5	17.9	2.4	0.7
Capacity for Intimate Contact	91	17.9	3.0	18.9	3.1	1.0***	44	19.1	2.7	19.5	3.1	0.4	19	18.4	2.0	19.8	3.0	1.4*

Note.-- \* Significant at .05 level  
 \*\* Significant at .01 level  
 \*\*\* Significant at .001 level



modest, reached significance for eight of 12 scales, including inner directed (an overall measure of self-actualization and growth in inter-personal interaction) and several subscales, each of which measures a conceptually important element of self-actualization. As hypothesized, significant change was found on existentiality (greater flexibility in the application of values), feeling reactivity (sensitivity to needs and feelings), capacity for intimate contact (a measure of the ability to develop meaningful relationships and perceive situations from another's position), spontaneity (the ability to express feelings), and self-acceptance (acceptance in spite of weaknesses or deficiencies). Although significant increases were predicted in self-regard, consideration, structure, and tolerance for ambiguity, these hypotheses were not supported.

Trainees in the HRDC experimental group earned significantly higher posttest scores on support (needs to be treated with understanding), independence (needs to be free to make decisions), and acceptance of others (the ability to accept other individuals with different values). Significantly lower scores were found on structure, conformity (doing what is accepted and proper), and benevolence. Increases reached significance for three of 12 POI scales inner directed, feeling reactivity, and self-acceptance.

To a great degree, the impact of ICR training is consistent both with respect to the dimensions of the Profile of Cross-cultural Readiness (PCCR) presented in the Handbook for Overseas Diplomacy (1973) and the training objectives developed for this evaluation. For example, one dimension of the PCCR refers to self-awareness skills and another to acceptance level. The change scales used in this evaluation, particularly self-acceptance and acceptance of others, appear to measure these two PCCR dimensions. Changes on these scales indicated that trainees increased in the extent to which they are guided by internalized values, a sense of self-worth, and the acceptance of others who may live by different values. A second PCCR dimension, adaptability, appears to be closely related to the flexibility scale used in this evaluation. Due to ceiling effects noted above, the HRDC experimental group did not change on this scale. However, higher scores in the ODT/PEP group indicate an increase in the ability to be flexible in forming attitudes, in accepting the values of other individuals, and a readiness to make changes in behavior. Finally, capacity for intimate contact seems to overlap with another significant PCCR skill--empathy. It was found that ODT/PEP trainees significantly increased their ability to see situations from the perspective of other individuals.

It was found that after training both experimental groups had significantly lower scores on structure. This decrease reflects less concern for defining and structuring the subordinate's role toward goal attainment. No changes were observed on consideration (i.e., the input of subordinate influence on policy decisions). To some degree, the decrease in structure is consistent with significant increases in needs for independence in both experimental groups and decreased conformity scores in the HRDC

group. Carron (1964) reported the same findings regarding decreased structure for supervisors receiving management training in a chemical company. He found that more emphasis on planning and organizing reversed this decrease and, in subsequent training cycles, supervisors changed toward a high consideration-high structure pattern. Since high scores on both scales of leadership style are likely to maximize a variety of different effectiveness criteria, including job performance, attitudes, and proficiency ratings, the results reported for the ICR programs are not interpreted to indicate a favorable course outcome. Examination of the content of the programs might indicate that more emphasis on planning and organizing was needed and could result in both higher consideration and structure scores following training.

The critical test of program effectiveness is a direct statistical test of the question: Did the HRDC and ODT/PEP experimental groups change significantly more on any of the attitude measures than the control group? It was found that ODT/PEP trainees decreased significantly less on consideration than the control group ( $t = 2.14, p < .05$ ), and decreased significantly more on structure than the control group ( $t = 2.60, p < .05$ ). On the acceptance of others scale, ODT/PEP trainees tended to increase significantly more than the control group, whose scores decreased ( $t = 1.97, p < .06$ ). HRDC trainees decreased significantly more than the control group on structure ( $t = 2.45, p < .05$ ) and increased more on acceptance of others than the control group ( $t = 2.84, p < .01$ ). No other differences reached significance.

These results provide minimal support for the hypothesis that the experimental groups changed significantly more than the control group. As noted earlier, ceiling effects on self-acceptance, the LOQ, and other scales, including the POI, may account for the modest changes found. However, changes were generally in the hypothesized direction. A greater number of significant changes were found in the experimental groups than in the control group.

Due to the considerable overlap between the various scales (and particularly the items that make up each of the scales), the development of an empirically constructed key designed to provide a homogeneous measure of cultural awareness is indicated. Such a key could lead to shorter, more effective change measures.

The inability of the scales to identify significant change may be the result of the change processes themselves. One could argue whether 3 weeks of training can drastically change relatively stable individual characteristics, such as self-acceptance, interpersonal sensitivity, and flexibility. What may be occurring over training is the development of an attitude of receptivity toward change. This receptivity may manifest itself in the form of long-range attitudinal and behavioral effects only when the graduate has the opportunity to practice and receive feedback on these new skills, i.e., in a foreign setting. Obviously, it is more

important to examine change over a substantial period of time than change immediately after the conclusion of training.

## 2. Self-Reported Change

The change questionnaire, a measure of self-reported change, was administered to trainees at the conclusion of training. Table 3 shows the number and percent of trainees in the experimental and control groups responding positively to Change Questionnaire items. Both ODT/PEP and HRDC trainees reported the same kinds of changes. For example, both groups reported the largest positive change on understanding of others (item 16), flexibility in thinking (item 24), and sympathetic listener (item 25).

For most items, a greater percentage of the experimental groups reported positive change than the control group. The average number of positive changes in the ODT/PEP group was 10.3. In the HRDC group, the average was 11.1. The control group reported an average of 5.8 changes. The difference between the number of changes reported by the ODT/PEP group and the control group was significant ( $t = 2.44$ ,  $p < .05$ ), as was the difference between the HRDC group and the control group ( $t = 2.25$ ,  $p < .05$ ).

With reference to self-reported change, it is concluded that ICR training had significant impact. Both experimental groups reported more self-perceived change than the control group. In general, this impact was compatible with program goals and objectives.

## 3. Factor Analysis of ODT/PEP Test Scores

The correlation matrix presented for ODT/PEP in Table 4 shows the pretest correlations between the attitude tests, and provides a measure of the construct validity of the various scales. As can be seen, the inner directed scale is closely related to the other POI scales. This is largely because of item overlap between this scale and the various other POI scales. This overlap suggests that the length of this scale could be considerably reduced without reducing content coverage. The independence of the two LOQ scales of consideration and structure is confirmed. Flexibility is seen to be moderately related to tolerance of ambiguity and spontaneity and, as might be expected, negatively related to conformity. Further, the self-acceptance scale of Berger shows construct validity by its high relationship to the POI scales of self-regard and self-acceptance.

Due to the number of moderate correlations between the attitude tests, an orthogonal factor analysis was performed on pretest and posttest scores in order to get a clearer picture of what the various scales measure. It was anticipated that this procedure would disclose an underlying pattern of relationships such that the data could be reduced to a smaller set of components.

TABLE 3

## Self-reported Positive Change for Experimental and Control Groups

Item	<u>ODT/PEP</u> <u>Experimental Group</u> (N=115)		<u>HRDC</u> <u>Experimental Group</u> (N=45)		<u>Control Group</u> (N=19)	
	N	%	N	%	N	%
1. Trusting in relations with co-workers	41	36	25	56	3	16
2. Dealing with problems	65	57	28	62	9	47
3. Trusting in relations with friends	43	37	22	49	4	21
4. Relaxed	46	40	25	56	2	11
5. Other-person centered	53	46	17	38	2	11
6. Enjoy being with others	47	41	17	38	8	42
7. High aspirations	41	36	19	42	7	37
8. Easy going	28	24	10	22	4	21
9. Working well with co-workers	41	36	24	53	4	21
10. Clear in thinking	49	43	22	49	3	16
11. Feel good about self	41	36	26	58	5	26
12. Working well with people in authority	35	30	14	31	2	11
13. Sincere	46	40	23	51	6	32
14. Liberal	19	17	12	27	2	11
15. Decisive	28	24	10	22	3	16
16. Understanding of others	81	70	35	78	6	32
17. Self-control	50	43	15	33	8	42
18. Self-assured	32	28	18	40	3	16
19. Able to help others with problems	52	45	25	56	5	26
20. Energetic	34	30	14	31	4	21
21. Optimistic toward future	51	44	22	49	8	42
22. Independent	24	21	11	24	4	21
23. Unshakable	21	18	10	22	0	0
24. Flexible in thinking	68	59	31	69	6	32
25. Sympathetic listener	65	57	28	62	5	26

TABLE 4

Intercorrelations Among ODI/PEP Pretests and Correlations with Self-reported Change<sup>1</sup>

	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25
1. <u>Flexibility</u>	-	-34	24	-13	13	-40	-05	02	19	12	22	21	23	28	22	30	21	36	03	19	20	34	09	24	18
2. <u>Tolerance of Ambiguity</u>	-	-07	-13	-18	40	28	-30	-15	-01	-33	-22	-23	-29	-22	-32	-23	-18	-30	-27	-31	-20	-22	-12	10	
<u>Leadership Opinion Questionnaire</u>																									
3. <u>Consideration</u>	-	06	21	-20	05	-21	39	-18	27	31	06	06	08	04	-09	24	06	14	22	14	01	-01	17		
4. <u>Structure</u>	-	-25	10	01	-10	-07	23	23	-03	-07	01	03	-13	-02	05	02	05	02	-07	19	-05	-13			
<u>Survey of Interpersonal Values</u>																									
5. <u>Support</u>	-	-40	28	-02	-05	-54	-29	-07	-10	09	-01	29	08	07	-20	14	14	20	-13	-06	14				
6. <u>Conformity</u>	-	-33	-29	10	-25	-05	-03	-06	-27	-29	-39	-21	-30	03	-15	-06	-26	02	-06	03					
7. <u>Recognition</u>	-	-43	-39	13	-26	-35	-09	-20	-01	-04	-13	-08	-16	-14	04	-10	-25	-28	-01						
8. <u>Independence</u>	-	-23	-02	24	04	23	28	16	24	23	07	20	12	02	14	12	20	-11							
9. <u>Benevolence</u>	-	-47	-10	48	-08	02	-10	03	01	16	-14	11	-06	05	-03	12	22								
10. <u>Leadership</u>	-	36	-12	08	09	29	-05	05	07	20	-08	-02	01	17	01	-22									
11. <u>Self-Acceptance</u>	-	59	52	47	35	25	29	34	53	49	25	27	46	28	-18										
12. <u>Acceptance of Others</u>	-	37	34	04	26	28	33	19	36	13	31	31	28	-17											
<u>Personal Orientation Inventory</u>																									
13. <u>Time Competence</u>	-	51	25	51	32	29	44	43	21	23	26	40	-09												
14. <u>Inner Directed</u>	-	55	80	71	59	42	74	32	47	65	75	-10													
15. <u>Self-Actualization Value</u>	-	40	34	41	29	18	35	58	46	28	-03														
16. <u>Existentiality</u>	-	54	42	20	61	19	43	42	68	-11															
17. <u>Feeling Reactivity</u>	-	34	18	41	12	27	56	63	-20																
18. <u>Spontaneity</u>	-	27	42	16	40	43	38	05																	
19. <u>Self-Regard</u>	-	25	20	05	29	33	02																		
20. <u>Self-Acceptance</u>	-	15	19	37	53	03																			
21. <u>Nature of Man</u>	-	42	17	06	06																				
22. <u>Synergy</u>	-	35	28	-03																					
23. <u>Acceptance of Aggression</u>	-	54	-05																						
24. <u>Empathy</u>	-	-12																							
25. <u>Self-Reported Change</u>	-																								

Note.--<sup>1</sup> Decimal Points omitted.

Variables loading on to a factor at .40 or better were considered to be major components of that factor. As seen in Table 5, the seven scales loading on pretest Factor 1 also all loaded on posttest Factor 1, with the exception of feeling reactivity. All the tests making up Factor 1 represented various POI scales. Of the 12 POI scales, nine are included in Factor Structure 1 for the posttests. The additional POI scales of self-regard, time competence, and self-actualization value, along with self-acceptance and independence, loaded on Factor 1 for the posttests. Since independence and self-acceptance are consistent with this theoretical construct, Factor 1 has been interpreted to represent self-actualization.

The following results concern posttest factors. Factor 2 shows that flexibility and consideration load positively, while tolerance of ambiguity and conformity load negatively. Since the tolerance of ambiguity scale shows increased tolerance as scores decrease, this scale actually loads in the same direction as flexibility and consideration. This factor may best be seen as a measure of adaptability. Factor 3 is seen as representing acceptance of others. It consists of positive loadings on acceptance of others, self-regard, self-acceptance, benevolence, and consideration; and negative loadings on independence. Factor 4 is interpreted to represent an awareness factor. It consists of positive loadings on synergy, nature of man, and self-actualization value.

As seen in Table 5, factor structures are modified over training. Results from this analysis revealed four major posttraining factors of self-actualization, acceptance of others, adaptability, and awareness. This interpretation makes conceptual sense and is consistent with stated training objectives. By providing an empirical basis for selection and/or construction of relevant measurement techniques, this factor structure appears to be of value for future ICR training evaluations. This conclusion is consistent with an earlier recommendation to reduce the total number of scales through item analysis in order to arrive at a homogeneous measure of cultural awareness.

#### 4. Comparison of ODT/PEP and HRDC Personnel

It was noted earlier in this report that the two experimental groups differed on both biographical data characteristics and pretest scores. These pretest differences were tested for statistical significance. It was found that HRDC trainees earned significantly higher pretest scores on flexibility, consideration, and independence, and significantly lower scores on structure and conformity ( $p < .01$ ). The HRDC experimental group also scored significantly higher on three POI scales--inner directed, existentiality, and capacity for intimate contact ( $p < .05$ ). There were no significant differences between the two ICR training groups on tolerance of ambiguity, acceptance of others, or self-acceptance.

To a large degree, the selection process for HRDC ICR specialists resulted in trainees whose attitudes and psychological makeup were

TABLE 5  
Pre - Post Factor Structures for ODT/PEP Personnel

	PRETEST <sup>1</sup>				POSTTEST <sup>2</sup>			
	FACTOR 1 Self-Actualization	FACTOR 2 Altruism	FACTOR 3 Acceptance	FACTOR 4 Self-Reliance	FACTOR 1 Self-Actualization	FACTOR 2 Adaptability	FACTOR 3 Acceptance	FACTOR 4 Awareness
Flexibility	.156	.238	.081	.440	.108	.742	.093	.074
Tolerance of Ambiguity <sup>1</sup>	-.116	-.104	-.186	-.391	-.284	-.577	-.132	.011
Leadership Opinion Questionnaire								
Consideration	-.111	.461	.187	.197	.058	.460	.440	.152
Structure	.009	.005	.059	-.040	-.043	-.093	.064	-.181
Survey of Interpersonal Values								
Support	.761	-.089	-.184	.298	-.014	.315	-.070	.066
Conformity	-.137	.108	.053	-.971	-.238	-.661	.266	-.108
Recognition	-.130	-.402	-.066	.258	-.143	.061	-.027	.077
Independence	.141	-.232	.162	.162	.515	-.002	-.456	.071
Benevolence	.047	.933	.193	-.019	-.108	.039	.410	-.080
Leadership	.017	-.342	.177	.317	-.026	.231	-.169	-.042
Self-Acceptance	.216	.145	.786	.080	.523	.127	.567	.016
Acceptance of Others	.224	.572	.402	.021	.166	.093	.736	.168
Personal Orientation Inventory								
Time Competence	.369	.001	.637	.043	.614	.159	.270	.173
Inner Directed	.838 <sup>3</sup>	-.004	.245	.113	.877	.142	.104	.257
Self-Actualization Value	.339	-.088	.070	.177	.439	.212	.162	.572
Existentiality	.754	-.324	.273	.258	.834	.279	-.046	.745
Feeling Reactivity	.711	-.014	.056	.102	.391	.137	-.054	.017
Self-Regard	.226	-.086	.481	-.044	.424	-.202	.503	.199
Self-Acceptance	.631	.123	.364	.087	.839	.141	.064	-.056
Nature of Man	.037	-.024	.202	.028	.034	-.055	.091	.751
Synergy	.262	.121	.020	.145	.280	.348	.115	.639
Acceptance of Aggression	.626	.039	.087	-.109	.587	-.009	.099	.105
Capacity for Intimate Contact	.823	.085	.104	-.098	.727	.020	.109	.071
Spontaneity	.459	.222	.140	.229	.512	.270	.229	.188
Self-Reported Change <sup>2</sup>	-	-	-	-	-.047	.036	.022	-.013

NOTE:—<sup>1</sup>Tests of Tolerance of Ambiguity are scored such that higher scores reflect more intolerance of ambiguity, lower scores reflect more tolerance.

<sup>2</sup>Self-Reported Change Questionnaires were not administered in pretesting.

<sup>3</sup>Underscored factor scores are the major components of their respective factors.

consistent with stated program objectives such as adaptability, increased interpersonal sensitivity, consideration shown to co-workers, and openness to new experiences. It is not known, however, to what degree these characteristics are related to on-the-job performance or job satisfaction.

#### E. Summary and Conclusions

When the change experienced by ODT/PEP and HRDC ICR Specialists was compared to change scores obtained by a control group, minimal support was provided for the hypothesis that ICR training would have a significant impact upon attitude change. This may have resulted from various test ceiling effects, whereby change was limited by initially high pretest scores or from the nature of the change process itself. It was hypothesized that significant attitudinal change may occur only after the development of receptivity toward change or after trainees have had the opportunity to practice and receive feedback on newly acquired adjustment skills. Due to overlap between the various tests and the items that make up each of the scales, it was hypothesized that development of an empirically derived key providing a shorter overall measure of cultural awareness would provide more sensitive change measures. Results from a factor analysis of pretests and posttests supported the last hypothesis.

The real test of program impact, however, concerns the development of externally based, or product, criteria of effectiveness. This involves validation against product criteria such as career and job satisfaction and both survey-based and unobtrusive behavioral indices of overseas diplomacy. Process criteria--such as relevant standardized self-report tests of the type used in this evaluation and other process indices such as unobtrusive in-class behavioral measures; independent observer, peer, and instructor evaluations; and performance on tests measuring cognitive or knowledge skills--should be validated against these product criteria. This would provide a more comprehensive evaluation of program effectiveness and indicate whether skills learned in training were transferred and practiced in-country. The follow-up instruments and procedures proposed for this evaluation, which included administration of course critiques, readministration of relevant change scales to measure the stability of change, and administration of attitude surveys to trained and untrained in-country personnel, would have provided a more comprehensive feedback loop. The information which is provided, however, does indicate that the impact of ICR training, although modest, is consistent with the training goals of the program.





### References

1. Ajzen, I., & Fishbein, M. Attitudinal and normative variables as predictors of scientific behaviors, Journal of Personality and Social Psychology, 1973, 27, 41-57.
2. Andrews, K. The effectiveness of university development management programs. Boston: Harvard Graduate School of Business Administration, 1966.
3. Berger, E. M. The relation between expressed acceptance of self and expressed acceptance of others, Journal of Abnormal and Social Psychology, 1952, 47, 778-782.
4. Brislin, R. W. The content and evaluation of cross-cultural training programs. Institute for Defense Analyses, IDA Research Paper P-671, November 1970.
5. Budner, S. Intolerance of ambiguity as a personality variable, Journal of Personality, 1962, 30, 29-50.
6. Campbell, J. P., & Dunnette, M. D. Effectiveness of T-group experiences in managerial training and development, Psychological Bulletin, 1968, 70, 73-104.
7. Campbell, J. P., Dunnette, M. D., Lawler, E., & Weick, K. Managerial behavior, performance, and effectiveness. New York: McGraw-Hill, 1970.
8. Carron, T. J. Human relations training and attitude change: A vector analysis, Personnel Psychology, 1964, 17, 403-424.
9. Fiedler, F. E., Mitchell, T., & Triandis, H. C. The culture assimilator: An approach to cross-cultural training, Journal of Applied Psychology, 1971, 55, No. 95-102.
10. Fishbein, M. & Ajzen, I. Attitudes and opinions, Psychological Review, 1972, 487-544.
11. Fleishman, E. A. & Harris, E. F. Patterns of leadership behavior related to employee grievances and turnover, Personnel Psychology, 1962, 13, 43-56.
12. Fleishman, E. A. Manual for leadership opinion questionnaire. Chicago: Science Research Associates, 1969.
13. Foster, R. G., & Danielson, J. An analysis of human relations training and its implications for overseas performance, HumRRO Technical 66-15, August 1966.
14. Gordon, L. V. Manual for the survey of interpersonal values. Chicago: Science Research Associates, 1960.

15. Haines, D. B. Training for culture-contact and interaction skills, Air Force Systems Command, Wright-Patterson Air Force Base, AD 611022, December 1964.
16. Hand, H. H., & Slocum, J. W., Jr. A longitudinal study of the effects of a human relations training program on managerial effectiveness, Journal of Applied Psychology, 1972, 56, 412-417.
17. Hoehn, A. J., The design of cross-cultural training for military advisors, HumRRO Professional Paper 12-66, December 1966.
18. Human Resource Development Project Office, Guidelines for United States Navy overseas diplomacy, Bureau of Naval Personnel, NAVPERS 15248.
19. Lau, A. W. An evaluation of intercultural relations training for Navy overseas personnel. Paper presented at the International and Intercultural Communications Conference, Pepperdine University, 18 May 1974.
20. Lau, A. W., & Curtis, E. W. The effectiveness of intercultural relations training for Vietnam advisors. San Diego: Navy Personnel and Training Research Laboratory, June 1973. (Research Report SRR 73-20)
21. Lau, A. W., and Blanchard, P. N. Interim report on evaluation of ICR training. San Diego: Navy Personnel Research and Development Center, September 1973.
22. Lieberman, M. A., Yalom, I. D., & Miles, M. B. The impact of encounter groups on participants: Some preliminary findings, Journal of Applied Behavioral Sciences, 1972, 8, 29-50.
23. MacKinney, A. Progressive levels in the evaluation of training programs, Personnel, 1957, 34, 72-77.
24. McNemar, Q. Psychological statistics. New York: John Wiley & Sons, 1960.
25. Miles, M. B. Learning processes and outcomes in human relations training: A clinical-experimental study. Paper read at the meeting of the Eastern Psychological Association, April 1964.
26. Shostrom, E. L. Manual for the Personal Orientation Inventory, San Diego: Educational and Industrial Testing Service, 1966.
27. Wight, A. E. Experimental cross-cultural training. Estes Park, Colorado: Center for Research and Education, 1970.
28. Yellen, T., & Hoover, M. W. In-country experiences: Navy personnel stationed in Greece. Washington, D. C.: U. S. Naval Personnel Research Laboratory, February 1973. (Special Report 20374)

APPENDIX A

SURVEY OF IN-COUNTRY ATTITUDES AND EXPERIENCES



## APPENDIX A

### SURVEY OF IN-COUNTRY ATTITUDES AND EXPERIENCES

1. If you received training, did this training help you to adjust to local conditions?

- a. Yes, quite a bit
- b. Yes, a little
- c. Not very much
- d. No, not at all
- e. I haven't received training

2.- How much more information or training in the following areas do you  
10. feel would have been of benefit to you for your assignment in this country?

- a. Training or information was not necessary in this area
- b. Training or information was adequate
- c. Some additional training or information was needed
- d. A great deal of additional training or information was needed

- |     |  |                           |     |     |  |
|-----|--|---------------------------|-----|-----|--|
| 2   | (a)  | (b)                       | (c) | (d) | Local customs and courtesies                             |
| 3.  | (a)  | (b)                       | (c) | (d) | Local laws   |
| 4.  | (a)  | (b)                       | (c) | (d) | History and political background of this country         |
| 5.  | (a)  | (b)                       | (c) | (d) | Interpersonal communication techniques                   |
| 6.  | (a)  | (b)                       | (c) | (d) | Effects of cross-cultural prejudice                      |
| 7.  | (a)  | (b)                       | (c) | (d) | Effects of culture on the way people behave              |
| 8.  | (a)  | (b)                       | (c) | (d) | Host country military decorum                            |
| 9.  | (a)  | (b)                       | (c) | (d) | System of social status in host country                  |
| 10. | (a)  | (b)                       | (c) | (d) | Understanding of prejudices among host country nationals |
| 11. | In general, how are you treated by the majority of host country nationals? |                           |     |     |  |
|     | a.   | Treated well              |     |     |  |
|     | b.   | Treated with indifference |     |     |  |
|     | c.   | Treated poorly            |     |     |  |
|     | d.   | Too hard to evaluate      |     |     |  |

12. How would you describe your relationship with host-country nationals?

- a. Have developed many solid friendships
- b. Occasionally socialize with them and have made a few friendships
- c. Have made some casual acquaintances
- d. Rarely associate with them
- e. Avoid association with them
- f. Have had no opportunity to interact with them .

13.- What is your attitude about each of the following aspects of the  
20. host country?

- a. Like
- b. Indifferent
- c. Dislike
- d. No chance to evaluate this

13. (a) (b) (c) (d) Local customs and courtesies

14. (a) (b) (c) (d) Local shops and stores

15. (a) (b) (c) (d) Public transportation

16. (a) (b) (c) (d) Social system

17. (a) (b) (c) (d) Military command procedure

18. (a) (b) (c) (d) Host-country nationals you work with

19. (a) (b) (c) (d) Host-country police

20. (a) (b) (c) (d) Host-country civilians

21. What kind of housing are you presently living in?

- a. On base
- b. Off base, U. S. military housing
- c. Off base, host-country housing
- d. Off base, temporary housing
- e. Other than above

22. Would you recommend traveling to this country to a friend?

- a. Yes
- b. No
- c. Don't know

23. Would you like to return to this country as a tourist?
- a. Yes
  - b. No
  - c. Don't know
24. How long have you been stationed in this country?
- a. 0-3 months
  - b. 3-6 months
  - c. 6-9 months
  - d. 9-12 months
  - e. More than 12 months
25. How would you describe your ability to speak the host-country language?
- a. A few words to no words
  - b. Simple phrases
  - c. Halting conversation
  - d. Speak with ease
26. Would you like to be stationed or home-ported in this country again?
- a. Would like to
  - b. Indifferent
  - c. Would dislike it
27. Have your views about relationships with foreign nationals changed since you left the States?
- a. Much more accepting
  - b. A bit more accepting
  - c. About the same
  - d. A little less accepting
  - e. Much less accepting
28. Have you had any unpleasant experiences with host-country nationals since your arrival?
- a. Yes, quite a few
  - b. Yes, some
  - c. Only one or two isolated instances
  - d. None at all
29. Please give examples, if you answered a, b, or c, above.



30. When interacting with host-country nationals, do you generally feel---

- a. Very uncomfortable or nervous?
- b. Slightly uncomfortable or nervous?
- c. No noticeable unpleasant feelings?

31. What is your opinion on the overall quality of instruction you received in preparation for your overseas assignment?

- a. Superior
- b. Above average
- c. Average
- d. Below average
- e. Poor
- f. Did not receive any training or instruction

32.- While you are stationed in this country have you, or do you intend  
42. to do the following?

- a. Have already
- b. Strongly intend to
- c. Probably will
- d. Probably will not
- e. Plan to avoid

- 32. (a) (b) (c) (d) (e) Visit places of historical importance
- 33. (a) (b) (c) (d) (e) Become close friends with several host-national
- 34. (a) (b) (c) (d) (e) Visit local taverns
- 35. (a) (b) (c) (d) (e) Attend sporting events
- 36. (a) (b) (c) (d) (e) Spend most of your free time with Americans
- 37. (a) (b) (c) (d) (e) Patronize local food stores
- 38. (a) (b) (c) (d) (e) Influence host nations to adopt American values which would improve them
- 39. (a) (b) (c) (d) (e) Change your life style in the direction of the host-country's life style
- 40. (a) (b) (c) (d) (e) Photograph the country and its people
- 41. (a) (b) (c) (d) (e) Purchase objects of art, souvenir items, etc.
- 42. (a) (b) (c) (d) (e) Attend host-country ceremonies and festivals

43.- Estimate how often you have social or personal contacts with host-  
51. country nationals in the situations listed below.

- a. Several times daily
- b. About once a day
- c. About once a week
- d. About once a month
- e. Less than once a month

43. (a) (b) (c) (d) (e) On-the-job association, with enlisted personnel
44. (a) (b) (c) (d) (e) On-the-job association, with officers
45. (a) (b) (c) (d) (e) Off-hours association, with enlisted personnel
46. (a) (b) (c) (d) (e) Off-hours association, with officers
47. (a) (b) (c) (d) (e) Commercial interaction with merchants
48. (a) (b) (c) (d) (e) Casual interaction with civilians
49. (a) (b) (c) (d) (e) Discussing personally revealing topics with  
a host national
50. (a) (b) (c) (d) (e) Recreational activities (i.e., parties, games,  
sports, etc.)
51. (a) (b) (c) (d) (e) Eating a meal with a host-country family

52.- During your training experience did you have any difficulty with  
65. the following?

- a. Much difficulty
- b. Some difficulty
- c. No difficulty
- d. No opinion

- |     |     |     |     |     |  |
|-----|-----|-----|-----|-----|--|
| 52. | (a) | (b) | (c) | (d) | Length of training sessions                |
| 53. | (a) | (b) | (c) | (d) | Amount of paper work                       |
| 54. | (a) | (b) | (c) | (d) | Communication with the staff               |
| 55. | (a) | (b) | (c) | (d) | Pace of training                           |
| 56. | (a) | (b) | (c) | (d) | Other students in your training class      |
| 57. | (a) | (b) | (c) | (d) | Number of students in your class           |
| 58. | (a) | (b) | (c) | (d) | Amount of material presented (too much)    |
| 59. | (a) | (b) | (c) | (d) | Amount of material presented (too little)  |
| 60. | (a) | (b) | (c) | (d) | Amount of homework                         |
| 61. | (a) | (b) | (c) | (d) | Handouts                                   |
| 62. | (a) | (b) | (c) | (d) | Taped presentations                        |
| 63. | (a) | (b) | (c) | (d) | Amount of knowledge displayed by the staff |
| 64. | (a) | (b) | (c) | (d) | Being able to present your opinions        |
| 65. | (a) | (b) | (c) | (d) | Getting feedback on your performance       |

## DISTRIBUTION LIST

Chief of Naval Operations (Op-04R12)  
(Op-103B)  
(Op-099)  
(Op-987E)

Chief of Naval Personnel (Pers-1)  
(Pers-10c)  
(Pers-2B)  
(Pers-4)  
(Pers-5)  
(Pers-6)  
(Pers-6c)  
(Pers-6c13) (10)

Chief of Naval Material (NMAT 030B)

Chief of Naval Research (Code 450) (4)

Chief of Naval Education and Training

Commandant of the Marine Corps

Commander in Chief, Atlantic Fleet

Commander in Chief, Pacific Fleet

Commander in Chief, U. S. Naval Forces, Europe

Commander, Sixth Fleet

Commander, Seventh Fleet

Commanding Officer, Naval Education and Training Program Development Center

Commanding Officer, Naval Development and Training Center (Code 0120)

Commanding Officer, Human Resources Management Center, Norfolk

Commanding Officer, Human Resources Management Center, Pearl Harbor

Commanding Officer, Human Resources Management Center, San Diego

Commanding Officer, Human Resources Management Center, Washington, D. C.

Commanding Officer, Naval Health Research Center

Commanding Officer, Naval Amphibious School, Coronado

Superintendent, Naval Postgraduate School, Monterey

Center for Naval Analyses

Army Research Institute for the Behavioral and Social Sciences

Air Force Human Resources Laboratory (AFSC), Lackland Air Force Base  
Personnel Research Division  
Technical Library

Director, Office of Civilian Manpower Management

Assistant Director, Life Sciences, Air Force Office of Scientific Research

Foreign Services Institute, State Department

Defense Race Relations Institute, Patrick Air Force Base, Florida

Human Resources Development Division, U. S. Army Personnel and  
Administration Combat Developments Activity

Technical Training Division, Air Force Base, Human Resources Laboratory,  
Lowry Air Force Base

Flying Training Division, Air Force Human Resources Laboratory, Williams  
Air Force Base

Advanced Systems Division, Air Force Human Resources Laboratory, Wright-  
Patterson Air Force Base

Defense Documentation Center (12)



DEPARTMENT OF THE NAVY

NAVY PERSONNEL RESEARCH  
AND DEVELOPMENT CENTER  
SAN DIEGO, CA 92152

OFFICIAL BUSINESS

PENALTY FOR PRIVATE USE, \$300

POSTAGE AND FEES PAID  
DEPARTMENT OF THE NAVY  
DOD-316



U 1652